



September 20, 2018

The Honorable Andrei Iancu
Under Secretary of Commerce for Intellectual Property and
Director of the United States Patent and Trademark Office
United States Patent and Trademark Office
600 Dulany Street Alexandria, VA 22314
Via Email: Strategicplanning1@USPTO.gov

Comments on the Draft 2018-2022 Strategic Plan, United States Patent and Trademark Office

Dear Under Secretary Iancu:

BSA | The Software Alliance¹ submits the following response to the request of the United States Patent and Trademark Office (“USPTO” or “the Office”) for comments on the USPTO’s draft Strategic Plan for 2018-2022. BSA commends the USPTO’s efforts in formulating the draft Strategic Plan to identify mission-focused strategic goals.

BSA is an association of the world’s leading software and hardware technology companies. On behalf of its members, BSA promotes policies that foster innovation, growth, and a competitive marketplace for commercial software, artificial intelligence (AI), and related technologies.

BSA members are among the Nation’s leading technology companies, producing much of the hardware and software that power computer and telecommunication networks. Due to the complexity and commercial success of their products, these companies are frequently the subject of patent infringement claims. At the same time, by virtue of their inventions, BSA members hold hundreds of thousands of patents. Our members invest billions of dollars in research and development (R&D) every year, and rely on intellectual property (IP) for the viability of their business. IP is the cornerstone of innovation – giving creators confidence that it is worth the risk to invest resources in developing and commercializing new ideas. For the software industry, a robust IP framework is fundamental to innovation, and the patent system is an indispensable part of this framework. Such innovation requires a predictable and well-functioning patent system that encourages investments in R&D and commercialization relating to new technologies, without fostering conditions for abuse of the system. As innovators and patent holders, BSA members have a particularly acute

¹ BSA’s members include: Adobe, ANSYS, Apple, Autodesk, Bentley Systems, Box, CA Technologies, Cadence, CNC/Mastercam, DataStax, DocuSign, IBM, Informatica, MathWorks, Microsoft, Okta, Oracle, PTC, Salesforce, SAS Institute, Siemens PLM Software, Splunk, Symantec, Trend Micro, Trimble Solutions Corporation, and Workday.

interest in a well calibrated mechanisms for ensuring patent quality. Against this background, BSA encourages the USPTO to:

- (1) continue its work to ensure patent quality;
- (2) modernize the USPTO's Information Technology (IT) infrastructure;
- (3) work to enhance the operation of the Patent Trial and Appeal Board (PTAB) without making changes that would undermine its effectiveness or the effectiveness of Inter Partes Review (IPR) and Post Grant Review (PGR) proceedings; and
- (4) ensure that USPTO's international advocacy efforts are forged around the principle of promoting alignment with US copyright law – focusing not only on the critical importance and enforcement of core substantive protections, but also on the indispensable role that exceptions and limitations play in promoting software innovation, particularly as it relates to AI.

We address each of these recommendations in turn below.

1. Continuing USPTO's Work to Ensure Patent Quality

Efforts to improve patent quality should remain a priority for the USPTO. Patent quality is essential to innovation. A patent is “a reward, an inducement, to bring forth new knowledge.”² Patents that should not have been issued – those in which the invention claimed is obvious or not novel – damage the public interest and chill the development of new technologies. One driver of patent litigation is the assertion of patents and claims that cannot withstand legal scrutiny, and that should not have been issued or allowed by the USPTO in the first place. Minimizing errors through a rigorous examination process will benefit all users of the patent system by increasing legal clarity regarding the scope of patent claims, reducing litigation risk and cost, and facilitating business planning and predictability. In this regard, increasing examiners' ability to obtain relevant prior art can reduce the probability that such prior art will only be discovered after a patent has been asserted. Expanding prior art databases and adopting AI-powered searching capabilities are two ways to advance this important objective. Improving the specificity and the quality of examiner communications in office actions can also enhance the examination process, and lead to more clearly drafted claims and a more thorough prosecution history record. These types of enhancements can reduce post-issuance uncertainties regarding the scope of the patent.

2. Modernizing USPTO's IT Infrastructure

BSA strongly supports upgrading and improving the USPTO's IT infrastructure. Reliable and efficient IT systems are a key factor in improving both patent quality and timeliness. The recent outages of the Public PAIR system highlight the need for such improvements. BSA and its member companies look forward to working with the USPTO in this effort to update and improve the Office's IT infrastructure.

² *Graham v. John Deere Co.*, 383 US 1, 9 (1966).

3. Enhancing the Operation of the PTAB Without Undermining the PTAB's Effectiveness or the Effectiveness of IPR or PGR Proceedings

BSA members broadly support the USPTO's goal of enhancing the operation of the PTAB, but caution against making any changes that would undermine the PTAB's effectiveness or the effectiveness of USPTO's IPR and PGR proceedings. BSA members have a variety of perspectives on how best to improve the patent system. At the same time, BSA members uniformly agree that since its creation by the America Invents Act (AIA), the IPR program overall has been an important contribution to the patent system. Clearing improperly granted claims out of the system in a timely and cost-effective manner is good for the overall patent system, and the IPR program has been successful in helping to accomplish this goal. That is why BSA's overarching priority is for the IPR program to be effective and function as Congress intended.

BSA's core objective in the legislative debates leading to enactment of the post-issuance proceedings in the AIA was to create a review system at the USPTO that would provide a more effective and efficient process to weed out invalid patent claims while preserving and strengthening valid patents. That remains BSA's objective in this debate.

IPR has been an extremely effective tool in weeding out invalid patent claims, which has reduced both the number and cost of frivolous lawsuits. That is why BSA believes the IPR program must remain strong and effective.

The problem of invalid patents being mistakenly issued by the USPTO is not new. "It is unrealistic to believe a patent examiner would know all of the places to look for [relevant] information" at the examination stage, "and even if the examiner knew where to look, it is unlikely he or she would have the time to search all of these nooks and crannies."³ Prior to the AIA, there was abusive behavior, often involving overly broad or invalid patents asserted against technology companies at an alarming rate and a significant cost. In part, this is because there was not a cost-effective method for accused infringers to challenge the validity of these patents. The only effective option accused infringers had was to litigate in district court. District court actions are extremely expensive and oftentimes more costly than the potential damages arising from an ultimate finding of infringement. Moreover, district court actions can take several years to adjudicate, leaving a cloud of uncertainty over the company for an extended period of time. This environment created fertile ground for bad actors to bring district court actions asserting arguably invalid patents with the knowledge that the accused infringer would likely settle the lawsuit to avoid the cost of litigation.

The IPR program has proven to be a very effective tool at curbing many abusive patent assertions and curbing settlement demands in appropriate situations. The program's effectiveness is supported by statistics. The cost of patent litigation has fallen dramatically since the passage of the AIA, and IPR has played a significant role.⁴ The positive effects of IPR are also demonstrated by the increased recognition among stakeholders, commentators, and the USPTO, that abusive litigation is no longer as prevalent as it was prior to enactment of the AIA. Any changes to the PTAB or to IPR or PGR proceedings,

³ 157 Cong. Rec. 2,843 (2011) (remarks of Sen. Klobuchar); see also 157 Cong. Rec. 3,401 (2011) (remarks of Sen. Leahy) ("Patent examiners are facing a difficult task" in weeding out low-quality patents "given the explosion in the number of applications and the increasing complexity of those applications.").

⁴ <https://www.bna.com/cost-patent-infringement-n73014463011/>.

including those intended to streamline procedures or standards, should be crafted in a way that safeguards these beneficial features of these proceedings.

Finally, BSA directs USPTO's attention to the comments submitted in response to USPTO's recent Federal Register notice relating to the claim construction standard in IPR and PGR proceedings, including BSA's view that any changes should not undermine the congressional balance reflected in, and predictability and effectiveness of, those proceedings. 83 Fed. Reg. 21221 (May 9, 2018) (Docket No. POT-P-2018-0036). BSA incorporates those comments by reference into this submission.

4. Ensuring that USPTO's International Advocacy Efforts are Forged Around the Principle of Promoting Alignment with US Copyright Standards, Focusing on Core Substantive Protections as well as Exceptions and Limitations, to Promote Software Innovation

US leadership on IP policy issues is critical to the development of global policy environment in which the technologies of tomorrow can emerge and flourish. In this regard, BSA supports the work of the Office of Policy and International Affairs (OPIA) and the Intellectual Property Attaché program in advancing patent, copyright, trademark, trade secret and other IP policy priorities. As regards copyright and related rights, BSA welcomes OPIA's advocacy efforts to encourage the adoption of copyright policies that support US investments in the digital environment. As the Draft Strategic Plan rightly notes, the competitiveness of US innovators in the globalized economy is buoyed by policies that create "as much certainty as possible in the creation, enforcement and protection of their IP, both domestically and abroad." The USPTO can play an important role in establishing such certainty by engaging with our trading partners to promote alignment with the US framework for IP protection. Critically, USPTO's international engagement should promote both the core substantive protections afforded by US copyright law as well as the critical flexibilities that have been integral to the development of digital technologies. We note the importance of such flexibilities to the development of AI technology in particular – an area in which US companies are global leaders.

The machine learning processes that power AI development depend on access to vast quantities of data. AI systems are "trained" by ingesting large data sets to identify underlying patterns, relationships, and trends that are then transformed into mathematical models that can make predictions based on new data inputs. For instance, developers have now created a "Seeing AI" app that helps people who are blind or visually impaired navigate the world by providing auditory descriptions of objects in photographs.⁵ Users of the app can use their smartphone to take pictures, and Seeing AI describes the people and objects in the photograph. To develop the computer vision model capable of identifying the objects in a picture, the system was trained using data from millions of publicly available images depicting thousands of common objects, such as trees, street signs, landscapes, and animals.

In the United States, the "non-consumptive" reproductions that are necessary for the development of technologies such as Seeing AI are considered a fair use. But in legal systems without similar flexibilities, there can be some uncertainty about the permissibility of such activity.⁶ To help mitigate such uncertainty, USPTO engagement with foreign governments should be designed to promote harmonization of both substantive IP

⁵ <https://www.microsoft.com/en-us/seeing-ai/>.

⁶ <https://techpost.bsa.org/2018/09/05/copyright-proposal-threatens-to-undermine-europes-ai-ambitions/>.

protections, but also the limitations and exceptions that are themselves critical drivers of innovation and creativity.

Conclusion

We are grateful to the USPTO for the opportunity to comment on the draft Strategic Plan and forward to working with the Office as it moves forward in implementing it.